

# Assessing the cognitive abilities of children and young people with ASC

Why, how, what and when?

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# Structure of talk

- Why do we need to assess the cognitive abilities of children with ASD?
- When should we assess them (if ever)?
- How do we assess them?
- What do we use to assess them?

# But before we start.....

We approach the assessment and diagnosis of Autism Spectrum Conditions from different backgrounds, orientations and theoretical frameworks. (Welch, et al 1992)

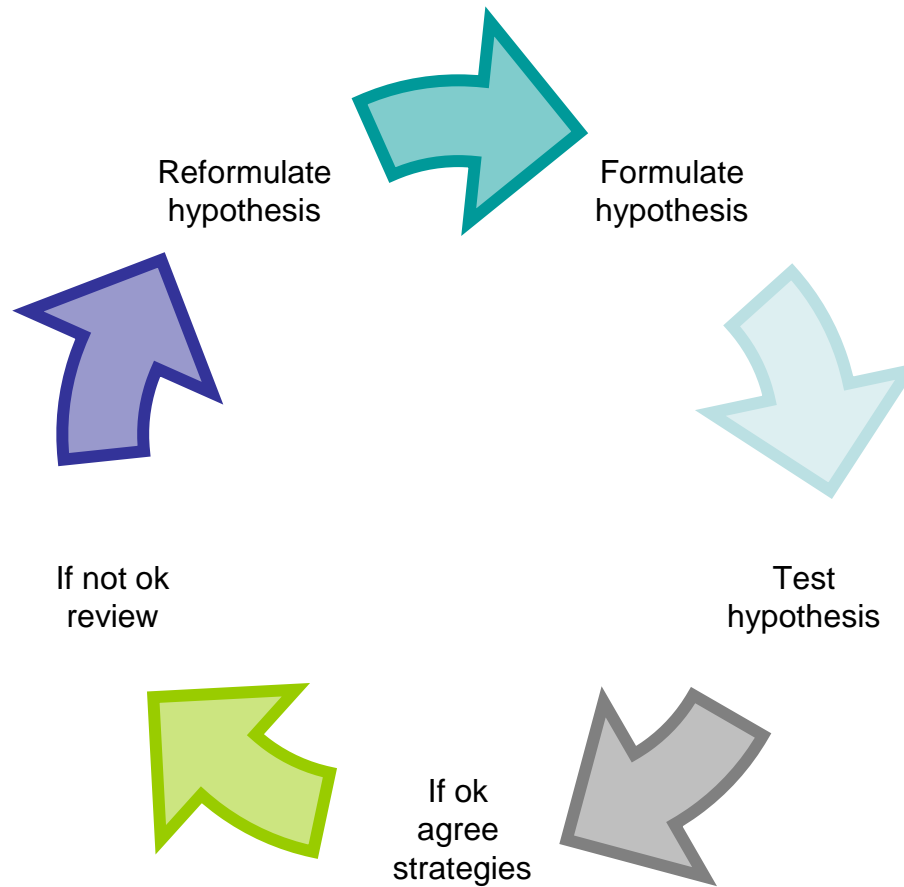
Clinical diagnosis vs identification of special educational needs (Jordan & Jones 1999, NIASA, 2003 Safran, 2008)

- A word of caution:
  - There is no definitive cognitive profile for ASD
  - Every person with the ASD label is an individual and unique. Just as there is no overarching cognitive profile for 'neurotypicals' there is no overarching cognitive profile for ASD.

# Why carry out assessments?

“A psychological assessment is the attempt of a skilled professional, usually a psychologist, to use the techniques and tools of psychology to learn either general or specific facts about another person, either to inform others of how they function now, or to predict their behaviour and functioning in the future.” Riolon 2012

# Formulation Cycle



# The positives?

Why do we  
assess  
children?

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graph TD; A[Why do we assess children?] --- B[To aid diagnosis]; A --- C[To help plan/provide interventions]; A --- D[To clarify nature of child's difficulties]; A --- E[To discover child's strengths];
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To aid  
diagnosis

To help plan/  
provide  
interventions

To clarify  
nature of child's  
difficulties

To discover  
child's strengths

# To aid diagnosis

- NICE guidelines suggest that it is helpful to understand a child's level of cognitive ability
- Cognitive ability can have an impact on other areas of functioning and lead to potential mis-diagnosis/misunderstanding



# To help plan interventions

- If we have a clear idea about how a child learns/about their strengths and needs we can plan home/classroom strategies that might assist their learning and social skills

# To help clarify nature of difficulties

- A better understanding of a child can help adult's understanding/increase tolerance
- Assessment can be 'therapeutic'
- Older children might be helped to better understand themselves

# To discover strengths

- Some children on the autistic spectrum have clear cognitive strengths that are often masked by their difficulties
- Understanding a child's strengths can provide a window into their learning
- This can increase confidence/self-esteem

# Negatives?

**Why do we  
assess  
children?**

**Because  
we are asked  
to  
do it by  
someone else.**

**Because that  
is what we  
always do**

**Because  
we are  
not sure what  
else to do**

**Because it  
seems  
like a good  
idea**

Because we are asked to do it by  
someone else

“Psychologists must ensure that assessment  
procedures are chosen, administered and  
interpreted appropriately and accurately”

Hannan (2005)

# Because that is what we always do

Assessments should never be administered without due regard to the question that you are trying to answer i.e. what is our hypothesis of what is going on?

# Because we are not sure what else to do.....

- Training issue
- Should professionals have special training in the assessment of CYP with ASD?
- Should there be a certificate of competency?

# Because it seems like a good idea?

- Not scientifically valid or ethical.



# When?

- At time of diagnosis?
- When school failure is looming?
- When child seems ready?
- When you can't think of anything else to do?
- When parent requests it?
- When child requests it?

# How?

- Assessing children with ASD poses a challenge because:
- Levels of attention and listening are often poor
- Language is often limited
- Child does not see the point of assessment and so will not conform
- Child will not engage with the test equipment

# What?

- Standardised tests might work but it is often not possible to administer test in a standardised way
- Assessor needs to have a range of tests at his/her disposal
- Non-verbal assessments may be more appropriate.

# Cognitive Assessment

## Combined

- WISC IV
- WPPSI,
- BAS III
- WAIS

## Non-verbal only

- Leiter
- WNV

## Developmental

- Griffiths
- Bayley III
- Mullen
- PEP 3
- Vineland  
(supplemental norms)

## Neuropsychological

- NEPSY II

- Interpretation of the results is key – scores may not be significant and can be misleading
- Assessment may need to be used ‘dynamically’

Attaining valid IQ score requires:

- Social Interaction
- Communication
- Self regulation (attention & behaviour control)
- Sensory regulation

# How to get a valid IQ score for children and young people with ASC Heffner (2005)

- Choose your examiner well
- Make sure the child is not ill and not in a bad mood
- Choose the time of day your child is at their best
- Talk to the examiner before the test telling them all about your child
- Take your child to the testing site ahead of time



- Write a social story about IQ tests
- Try to get the examiner to spend some non-threatening time with your child before the test.

## **The Identification of Autism Spectrum Disorders: A Primer for the School Psychologist Brock (2004)**

- Prepare the student for the testing experience
- Place the testing session in the student's daily schedule
- Minimize distractions
- Make use of pre-established physical structures and work systems
- Make use of powerful external rewards
- Carefully pre-select task difficulty
- Modify test administration and allow nonstandard responses

and we would add

- May need to take place over more than one session
- Often helpful (but not always) if the parent/caregiver is present

# In Summary

- Why do we need to assess the cognitive abilities of children with ASD?
- When should we assess them (if ever)?
- How do we assess them?
- What do we use to assess them?